Agency for Healthcare Research and Quality
Advancing Excellence in Health Care

NATIONAL GUIDELINE CLEARINGHOUSE

General

Guideline Title

Management of group B streptococcal bacteriuria in pregnancy.

Bibliographic Source(s)

Allen VM, Yudin MH. Management of group B streptococcal bacteriuria in pregnancy. J Obstet Gynaecol Can. 2012 May;34(5):482-6. [26 references] PubMed

Guideline Status

This is the current release of the guideline.

Recommendations

Major Recommendations

The quality of evidence (I-III) and classification of recommendations (A-L) are defined at the end of the "Major Recommendations."

Maternal And Perinatal Risks Associated With Any Asymptomatic Bacteriuria In Pregnancy

1. Treatment of any bacteriuria with colony counts ≥100,000 CFU/mL in pregnancy is an accepted and recommended strategy and includes treatment with appropriate antibiotics. (II-2A)

Maternal And Perinatal Risks Associated With Asymptomatic Group B Streptococcal (GBS) Bacteriuria In Pregnancy

2. Women with documented group B streptococcal bacteriuria (regardless of level of colony-forming units per mL) in the current pregnancy should be treated at the time of labour or rupture of membranes with appropriate intravenous antibiotics for the prevention of early-onset neonatal group B streptococcal disease. (II-2A)

Risk of Neonatal GBS Disease

3. Asymptomatic women with urinary group B streptococcal colony counts <100,000 CFU/mL in pregnancy should not be treated with antibiotics for the prevention of adverse maternal and perinatal outcomes such as pyelonephritis, chorioamnionitis, or preterm birth. (II-2E)

No Indication For Third Trimester Re-Screening For GBS Colonization

4. Women with documented group B streptococcal bacteriuria should not be re-screened by genital tract culture or urinary culture in the third trimester, as they are presumed to be group B streptococcal colonized. (II-2D)

Definitions:

Quality of Evidence Assessment*

I: Evidence obtained from at least one properly randomized controlled trial

II-1: Evidence from well-designed controlled trials without randomization

II-2: Evidence from well–designed cohort (prospective or retrospective) or case–control studies, preferably from more than one centre or research group

II-3: Evidence obtained from comparisons between times or places with or without the intervention. Dramatic results in uncontrolled experiments (such as the results of treatment with penicillin in the 1940s) could also be included in this category.

III: Opinions of respected authorities, based on clinical experience, descriptive studies, or reports of expert committees

*Adapted from the Evaluation of Evidence criteria described in the Canadian Task Force on Preventive Health Care.

Classification of Recommendations†

A. There is good evidence to recommend the clinical preventive action.

B. There is fair evidence to recommend the clinical preventive action.

C. The existing evidence is conflicting and does not allow to make a recommendation for or against use of the clinical preventive action; however, other factors may influence decision-making.

D. There is fair evidence to recommend against the clinical preventive action.

E. There is good evidence to recommend against the clinical preventive action.

L. There is insufficient evidence (in quantity or quality) to make a recommendation; however, other factors may influence decision-making.

†Adapted from the Classification of Recommendations criteria described in the Canadian Task Force on Preventive Health Care.

Clinical Algorithm(s)

None provided

Scope

Disease/Condition(s)

Group B streptococcal (GBS) bacteriuria in pregnancy

Guideline Category

Management

Treatment

Clinical Specialty

Family Practice

Infectious Diseases

Internal Medicine

Nursing

Obstetrics and Gynecology

Intended Users

Advanced Practice Nurses

Nurses

Physician Assistants

Physicians

Guideline Objective(s)

To provide information regarding the management of group B streptococcal (GBS) bacteriuria to midwives, nurses, and physicians who are providing obstetrical care

Target Population

Pregnant women

Interventions and Practices Considered

Antibiotic treatment of any bacteriuria (including group B streptococcal [GBS] bacteriuria) during pregnancy

Major Outcomes Considered

- Neonatal group B streptococcal (GBS) disease
- Preterm birth
- Pyelonephritis
- Chorioamnionitis
- Recurrence of GBS colonization

Methodology

Methods Used to Collect/Select the Evidence

Searches of Electronic Databases

Searches of Unpublished Data

Description of Methods Used to Collect/Select the Evidence

Medline, PubMed, and the Cochrane database were searched for articles published in English to December 2010 on the topic of group B streptococcal (GBS) bacteriuria in pregnancy. Bacteriuria is defined in this clinical practice guideline as the presence of bacteria in urine, regardless of the number of colony-forming units per mL (CFU/mL). Low colony counts refer to <100 000 CFU/mL, and high (significant) colony counts refer to ≥100 000 CFU/mL. Results were restricted to systematic reviews, randomized controlled trials, and relevant observational studies.

Searches were updated on a regular basis and incorporated in the guideline to February 2011. Grey (unpublished) literature was identified through searching the websites of health technology assessment and health technology assessment-related agencies, clinical practice guideline collections, clinical trial registries, and national and international medical specialty societies.

Number of Source Documents

Not stated

Methods Used to Assess the Quality and Strength of the Evidence

Weighting According to a Rating Scheme (Scheme Given)

Rating Scheme for the Strength of the Evidence

Quality of Evidence Assessment*

I: Evidence obtained from at least one properly randomized controlled trial

II-1: Evidence from well-designed controlled trials without randomization

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II-3: Evidence obtained from comparisons between times or places with or without the intervention. Dramatic results in uncontrolled experiments (such as the results of treatment with penicillin in the 1940s) could also be included in this category.

III: Opinions of respected authorities, based on clinical experience, descriptive studies, or reports of expert committees

*Adapted from The Evaluation of Evidence criteria described in the Canadian Task Force on Preventive Health Care.

Methods Used to Analyze the Evidence

Review of Published Meta-Analyses

Systematic Review

Description of the Methods Used to Analyze the Evidence

The quality of evidence was rated using the criteria described in the Report of the Canadian Task Force on Preventive Health Care (see the "Rating Scheme for the Strength of the Evidence" and the "Rating Scheme for the Strength of the Recommendations" fields).

Methods Used to Formulate the Recommendations

Expert Consensus

Description of Methods Used to Formulate the Recommendations

Not stated

Rating Scheme for the Strength of the Recommendations

Classification of Recommendations†

A. There is good evidence to recommend the clinical preventive action.

B. There is fair evidence to recommend the clinical preventive action.

C. The existing evidence is conflicting and does not allow to make a recommendation for or against use of the clinical preventive action; however, other factors may influence decision-making.

D. There is fair evidence to recommend against the clinical preventive action.

E. There is good evidence to recommend against the clinical preventive action.

L. There is insufficient evidence (in quantity or quality) to make a recommendation; however, other factors may influence decision-making.

†Adapted from the Classification of Recommendations criteria described in the Canadian Task Force on Preventive Health Care.

Cost Analysis

A formal cost analysis was not performed and published cost analyses were not reviewed.

Method of Guideline Validation

Internal Peer Review

Description of Method of Guideline Validation

This clinical practice guideline has been prepared by the Infectious Diseases Committee, reviewed by the Family Practice Advisory Committee, and approved by the Executive and Council of the Society of Obstetricians and Gynaecologists of Canada.

Evidence Supporting the Recommendations

Type of Evidence Supporting the Recommendations

The type of supporting evidence is identified and graded for each recommendation (see the "Major Recommendations" field).

Benefits/Harms of Implementing the Guideline Recommendations

Potential Benefits

The recommendations in this guideline are designed to help clinicians identify pregnancies in which it is appropriate to treat group B streptococcal (GBS) bacteriuria to optimize maternal and perinatal outcomes, to reduce the occurrences of antibiotic anaphylaxis, and to prevent increases in antibiotic resistance to GBS and non-GBS pathogens.

Potential Harms

- Antibiotic allergies, including anaphylaxis associated with group B streptococcal (GBS) prophylaxis, occur but are rare.
- Antibiotic resistance to GBS and non-GBS pathogens

Qualifying Statements

Qualifying Statements

Implementation of the Guideline

Description of Implementation Strategy

An implementation strategy was not provided.

Implementation Tools

Foreign Language Translations

For information about availability, see the *Availability of Companion Documents* and *Patient Resources* fields below.

Institute of Medicine (IOM) National Healthcare Quality Report Categories

IOM Care Need

Getting Better

Staying Healthy

IOM Domain

Effectiveness

Safety

Identifying Information and Availability

Bibliographic Source(s)

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Adaptation

Not applicable: The guideline was not adapted from another source.

Date Released

2012 May

Guideline Developer(s)

Society of Obstetricians and Gynaecologists of Canada - Medical Specialty Society

Source(s) of Funding

Society of Obstetricians and Gynaecologists of Canada

Guideline Committee

Infectious Diseases Committee

Composition of Group That Authored the Guideline

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Financial Disclosures/Conflicts of Interest

Disclosure statements have been received from all members of the committee.

Guideline Status

This is the current release of the guideline.

Guideline Availability

Electronic copies: Available in Portable Document Format (PDF) from the Society of Obstetricians and Gynaecologists of Canada Web site . Also available in French from the SOGC Web site .

Print copies: Available from the Society of Obstetricians and Gynaecologists of Canada, La société des obstétriciens et gynécologues du Canada (SOGC) 780 promenade Echo Drive Ottawa, ON K1S 5R7 (Canada)Í¾ Phone: 1-800-561-2416.

Availability of Companion Documents

None available

Patient Resources

None available

NGC Status

This NGC summary was completed by ECRI Institute on July 23, 2012. The information was verified by the guideline developer on August 15, 2012.

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